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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/816,967	03/23/2001	Gregory J. Mann	BUR9-2001-0025-US1	8686
29154	7590	07/28/2005	EXAMINER	
FREDERICK W. GIBB, III MCGINN & GIBB, PLLC 2568-A RIVA ROAD SUITE 304 ANNAPOLIS, MD 21401			FAROOQ, MOHAMMAD O	
			ART UNIT	PAPER NUMBER
			2182	
DATE MAILED: 07/28/2005				

Please find below and/or attached an Office communication concerning this application or proceeding.

**Office Action Summary**

Application No.

09/816,967

Applicant(s)

MANN, GREGORY J.

Examiner

Mohammad O. Farooq

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 15 April 2005.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-21 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-21 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 11 May 2001 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)  
Paper No(s)/Mail Date \_\_\_\_\_
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date \_\_\_\_\_
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: \_\_\_\_\_

## DETAILED ACTION

### *Continued Examination Under 37 CFR 1.114*

1. A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on April 15, 2005 has been entered.

### **Claim Rejections - 35 USC § 103**

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

2. Claims 1-21 are rejected under 35 U.S.C. 103(a) as being unpatentable over Aguilar et al. U.S. Pat. No. 6,199,137 in view of Clark et al. U.S. Pat. No. 5,425,022.

3. As to claim 1, Aguilar et al. teach a core for providing communications between a transmission media and a processor in a parallel-serial architecture, said core comprising:

serial lanes connecting said processor to said transmission media (i.e. via port; see fig. 2);

and

at least one selector (data MUX) connected to said serial lanes (see fig. 2).

However, Aguilar et al. do not teach selector selectively engages different number of said serial lanes to alter speed of data passing through said core. Clark et al. teach selector selectively engages different numbers of said serial lanes to alter speed of data passing through said core (abstract; col. 1, line 53 – col. 2, line 15; col. 7, lines 35-41). It would have been obvious to one of ordinary skill in the art at the time of invention to combine the teachings of Aguilar et al. and Clark et al. because that would detect the occurrence of slip between incoming and outgoing data (col. 3, lines 6-17).

4. As to claim 2, Aguilar et al. teach core further comprising a data controller (router; item 230, fig. 2) for controlling an operation of said selector.

5. As to claim 3, Aguilar et al. teach wherein each of said serial lanes include a buffer (see fig. 2).

6. As to claim 4, Aguilar et al. teach wherein said buffers comprise elastic (inherent) first-in, first-out (FIFO) buffers (see fig. 2).

7. As to claims 5, Aguilar et al. teach wherein said selector comprises a multiplexor (see item 250, fig. 2).

8. As to claims 6, Aguilar et al. teach wherein additional speed adjustments is attained by said selector engaging additional lanes (see fig. 2).

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9. As to claims 7, Aguilar et al. teach wherein said transmission media operates at a different data speed than said processor (inherent; see fig. 2).

10. As to claim 8, Aguilar et al. teach a parallel-serial system comprising:

at least one processor (item 210, fig. 2);

at least one transmission media (via ports; item 240, fig. 2) connecting said one processor (see fig. 2); and

a core between each processor and said transmission media, said core providing communication between said transmission media and said processor, and said core comprising:

serial lanes connecting said processor to said transmission media (i.e. via port; see fig. 2);

and

at least one selector (data MUX) connected to said serial lanes (see fig. 2).

However, Aguilar et al. do not teach selector selectively engages different number of said serial lanes to alter speed of data passing through said core. Clark et al. teach selector selectively engages different numbers of said serial lanes to alter speed of data passing through said core (abstract; col. 1, line 53 – col. 2, line 15; col. 7, lines 35-41). It would have been obvious to one of ordinary skill in the art at the time of invention to combine the teachings of Aguilar et al. and Clark et al. because that would detect the occurrence of slip between incoming and outgoing data (col. 3, lines 6-17).

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11. Claims 9-14 are similar in limitations as claims 2-7. Aguilar et al. and Clark et al. in combination teach apparatus as set forth in claims 2-7. Therefore, Aguilar et al. and Clark et al. in combination also teach apparatus as set forth in claims 9-14.

12. As to claim 15, Aguilar et al. teach a core for providing communications between a transmission media and a processor in a byte-stripped parallel-serial architecture, said core comprising:

serial lanes connecting said processor to said transmission media (i.e. via port; see fig. 2);  
and

at least one selector (data MUX) connected to said serial lanes (see fig. 2).

However, Aguilar et al. do not teach selector selectively engages different number of said serial lanes to alter speed of data passing through said core. Clark et al. teach selector selectively engages different numbers of said serial lanes to alter speed of data passing through said core (abstract; col. 1, line 53 – col. 2, line 15; col. 7, lines 35-41). It would have been obvious to one of ordinary skill in the art at the time of invention to combine the teachings of Aguilar et al. and Clark et al. because that would detect the occurrence of slip between incoming and outgoing data (col. 3, lines 6-17).

13. Claims 16-21 are similar in limitations as claims 2-7. Aguilar et al. and Clark et al. in combination teach apparatus as set forth in claims 2-7. Therefore, Aguilar et al. and Clark et al. also teach apparatus as set forth in claims 16-21.

***Response to Arguments***

14. Applicant's arguments with respect to claims 1-21 have been considered but are moot in view of the new ground(s) of rejection.


15. The examiner has provided new reference Clark et al. in this non-final rejection which teach "a switching node (comprising a multiplexer) for high speed data lines and low speed data lines (abstract; col. 1, line 53 – col. 2, line 15; col. 7, lines 35-41)," it is similar in concept as applicants' claim limitation "selectively engages different numbers of said serial lanes to alter a speed of data passing through said core" and it is part of the each independent claims. Therefore, the examiner has repeated the rejection of all of the claims in the patent application.

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16. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Mohammad O. Farooq whose telephone number is (571) 272-4144. The examiner can normally be reached on 9:00am - 5:30pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Dov Popovici can be reached on (571) 272-4083. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).



**KIM HUYNH**  
**PRIMARY EXAMINER**  
7/22/05

Mohammad O. Farooq  
July 20, 2005